

JUL 17 2015

Mr. Martin L. Smith  
Director of Corrective Measures  
Clean Harbors Environmental Services  
13652 CR 180  
Carthage, Missouri 64836

RE: Human Health Risk Assessment, Appendix G, RCRA Facility Investigation, Phase IV  
Clean Harbors (Wichita) Facility, 2549 New York Avenue, Wichita, Kansas  
EPA ID No. KSD007246846

Dear Mr. Smith:

The Human Health Risk Assessment presented during the initial RCRA Facility Investigation process and the revised Risk Assessment Report submitted as Appendix G of the Phase IV RFI were not approved by the EPA. The EPA provided comments on the Appendix G Risk Assessment on October 28, 2014. After discussions with Clean Harbor's representatives, review of the response to comments submitted by Clean Harbors and further review of Appendix G, the EPA has concluded that it is not necessary or appropriate to complete the risk assessment as presented due to the implementation of the RCRA Soil Interim Remedial Measures Work Plan.

Site data collected up to the time the IRM was proposed indicated that there were impacts to soil and to the Arkansas alluvial aquifer beneath the facility that originated from the Clean Harbors property. This aquifer is classified and used by the state of Kansas as a drinking water aquifer, therefore residential drinking water standards are applicable to the site. RFI data also indicated the presence of contaminant source areas on site that posed an ongoing threat to the drinking water aquifer.

Based on the ongoing threat to the aquifer, Clean Harbors proposed to address contaminant source areas by excavation and disposal of on-site soils impacted above the KDHE Tier 2 Risk-Based soil to ground water values and perform confirmation sampling. The EPA approved the IRM Work Plan with modification on July 31, 2014. Removal of the source material during implementation of the IRM significantly reduced the risk to human health and the environment associated with soil contamination on the Clean Harbors facility. The EPA has determined that the RFI sample results used to develop the Risk Assessment are no longer representative of current site conditions, and therefore the EPA recommends forgoing completion of this risk assessment.

This conclusion does not mean that there is no risk associated with the property, but rather reflects the need to evaluate risk based on current conditions. Therefore, instead of completing the previously submitted draft risk assessment, the EPA will require a screening level risk assessment based on the final soil confirmation samples collected from excavations during the IRM. If this screening level assessment indicates the presence of contamination in excess of current EPA Regional Screening Levels, additional risk assessment activities may be required.

BT: H:\AWMD\WRAP\2015 Correspondence\Jump\No Risk Assessment letter.docx

CONCURRENCES			
SYMBOL	WRAP	WRAP	WRAP
NAME	Jump	Murrow	Lining
INITIALS/DATE	CRS 7/17/15	PAM 7/17/15	BR For Lining

7-17-15

RCRA



538618

The EPA will also require a screening level risk assessment of ground water concentrations associated with the Clean Harbors facility; however, since most of the monitoring wells were abandoned as part of the IRM, this assessment should be conducted based on samples that will be collected from the approved monitoring network once it is installed. Clean Harbors and the EPA will coordinate to determine an appropriate monitoring period before conducting this screening-level risk assessment. Please note that a screening level evaluation of potential risk from vapor intrusion may also need to be performed based on current site conditions.

TCE concentrations up to 70 µg/L were detected in pore water samples collected from beneath the east fork of Chisolm Creek south east of the Clean Harbors facility during the Phase IV RFI. TCE concentrations above maximum contaminant levels were also detected in ground water collected from the most south eastern direct push probe location, T8-0. This indicates that the ground water plume emanating from the Clean Harbors facility is not fully delineated to the east or south, and additional sampling east of the creek and south along New York Avenue will be required to finalize the site monitoring network.

It is the EPA's understanding that Clean Harbors is in the process of preparing the IRM Completion Report in accordance with the approved IRM Work Plan. In addition to, or in conjunction with submittal of this report, the EPA requests that Clean Harbors prepare a proposal for installation of a site monitoring network for EPA review and approval. This proposal should consist of: replacement monitoring wells for critical wells removed during the IRM; monitoring wells on the down gradient side of source areas identified during the RFI and IRM in order to evaluate the effectiveness of the IRM; wells down gradient of the plume(s) to confirm contaminant concentrations are stable or decreasing; and monitoring wells necessary to evaluate/differentiate contamination migrating onto the site vs. contamination originating from on-site sources.

The EPA is continuing to review the RFI Phase IV Report and will provide detailed comments in the near future.

If you have any questions, please feel free to contact me at (913) 551-7141.

Sincerely,

Christine R. Jump, L.G.  
Waste Remediation and Permitting Branch  
Air and Waste Management Division

cc: John Cook, KDHE BER

bcc: Ann Jacobs, EPA ENST



**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION 7**

11201 Renner Boulevard  
Lenexa, Kansas 66219

**JUL 17 2015**

Mr. Martin L. Smith  
Director of Corrective Measures  
Clean Harbors Environmental Services  
13652 CR 180  
Carthage, Missouri 64836

RE: Human Health Risk Assessment, Appendix G, RCRA Facility Investigation, Phase IV  
Clean Harbors (Wichita) Facility, 2549 New York Avenue, Wichita, Kansas  
EPA ID No. KSD007246846

Dear Mr. Smith:

The Human Health Risk Assessment presented during the initial RCRA Facility Investigation process and the revised Risk Assessment Report submitted as Appendix G of the Phase IV RFI were not approved by the EPA. The EPA provided comments on the Appendix G Risk Assessment on October 28, 2014. After discussions with Clean Harbor's representatives, review of the response to comments submitted by Clean Harbors and further review of Appendix G, the EPA has concluded that it is not necessary or appropriate to complete the risk assessment as presented due to the implementation of the RCRA Soil Interim Remedial Measures Work Plan.

Site data collected up to the time the IRM was proposed indicated that there were impacts to soil and to the Arkansas alluvial aquifer beneath the facility that originated from the Clean Harbors property. This aquifer is classified and used by the state of Kansas as a drinking water aquifer, therefore residential drinking water standards are applicable to the site. RFI data also indicated the presence of contaminant source areas on site that posed an ongoing threat to the drinking water aquifer.

Based on the ongoing threat to the aquifer, Clean Harbors proposed to address contaminant source areas by excavation and disposal of on-site soils impacted above the KDHE Tier 2 Risk-Based soil to ground water values and perform confirmation sampling. The EPA approved the IRM Work Plan with modification on July 31, 2014. Removal of the source material during implementation of the IRM significantly reduced the risk to human health and the environment associated with soil contamination on the Clean Harbors facility. The EPA has determined that the RFI sample results used to develop the Risk Assessment are no longer representative of current site conditions, and therefore the EPA recommends forgoing completion of this risk assessment.

This conclusion does not mean that there is no risk associated with the property, but rather reflects the need to evaluate risk based on current conditions. Therefore, instead of completing the previously submitted draft risk assessment, the EPA will require a screening level risk assessment based on the final soil confirmation samples collected from excavations during the IRM. If this screening level





assessment indicates the presence of contamination in excess of current EPA Regional Screening Levels, additional risk assessment activities may be required.

The EPA will also require a screening level risk assessment of ground water concentrations associated with the Clean Harbors facility; however, since most of the monitoring wells were abandoned as part of the IRM, this assessment should be conducted based on samples that will be collected from the approved monitoring network once it is installed. Clean Harbors and the EPA will coordinate to determine an appropriate monitoring period before conducting this screening-level risk assessment. Please note that a screening level evaluation of potential risk from vapor intrusion may also need to be performed based on current site conditions.

TCE concentrations up to 70 µg/L were detected in pore water samples collected from beneath the east fork of Chisolm Creek south east of the Clean Harbors facility during the Phase IV RFI. TCE concentrations above maximum contaminant levels were also detected in ground water collected from the most south eastern direct push probe location, T8-0. This indicates that the ground water plume emanating from the Clean Harbors facility is not fully delineated to the east or south, and additional sampling east of the creek and south along New York Avenue will be required to finalize the site monitoring network.

It is the EPA's understanding that Clean Harbors is in the process of preparing the IRM Completion Report in accordance with the approved IRM Work Plan. In addition to, or in conjunction with submittal of this report, the EPA requests that Clean Harbors prepare a proposal for installation of a site monitoring network for EPA review and approval. This proposal should consist of: replacement monitoring wells for critical wells removed during the IRM; monitoring wells on the down gradient side of source areas identified during the RFI and IRM in order to evaluate the effectiveness of the IRM; wells down gradient of the plume(s) to confirm contaminant concentrations are stable or decreasing; and monitoring wells necessary to evaluate/differentiate contamination migrating onto the site vs. contamination originating from on-site sources.

The EPA is continuing to review the RFI Phase IV Report and will provide detailed comments in the near future.

If you have any questions, please feel free to contact me at (913) 551-7141.

Sincerely,



Christine R. Jump, L.G.  
Waste Remediation and Permitting Branch  
Air and Waste Management Division

cc: John Cook, KDHE BER